I am a registered professional engineer as well as a licensed Radio Amateur. I have had the opportunity to review Ameren's second report regarding the measurement of emissions from its power line communications (PLC)test in Cape Girardeau, MO (report dated June 5, 2003; Experimental License WC2XXK, Confirmaton NO EL12333, File No. 0093-EX-PL-2002).

The results of Ameren's study was that some emissions (above background) did result from operation of the PLC system. Ameren viewed these as minimal. Ameren utilized a spectrum analyzer and various portable antennas in their tests. During a subsequent test, others utilzing actual communications radios and commonly used antennas, noted significant interference emulated from that PLC system at levels which rendered large portions of the amateur radio spectrum unusable.

I believe that it is imperative to accurately measure the impact of these PLC systems on background RF noise levels over the spectrum that they utilize so that any conflicts with other licensed services can be identified and addressed. Toward this end, the Commission should develop standard testing protocals which consistantly measure background spectral purity and PLC's impact, if any, utilizing in part equipment commonly in use over the spectrum the PLC systems will use. That is, over the 2-300 Mhz range, highly sensitive communications receivers and gain directional antennas. Use of ONLY spectrum analyers and small portable antennas may severly understate the RF emissions from PLC systems and their impact to the other licensed spectrum users.